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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/876,782	06/07/2001	Christina Banta	US010388	8851
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EXAMINER COBANOGU, DILEK B				
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**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

# Office Action Summary

**Application No.**

09/876,782

**Applicant(s)**

BANTA ET AL.

**Examiner**

DILEK B. COBANOGU

**Art Unit**

3626

**Period for Reply** -- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 09 February 2009.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-28 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-28 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB/08)
- 4) ☐ Interview Summary (PTO-413)
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: \_\_\_\_\_

**DETAILED ACTION**

***Notice to Applicant***

1. This communication is in response to the order from the Board of Patent Appeals and Interferences to return the application to the Examiner. Claims 1-28 remain pending in this application, wherein claims 1, 2, 3, 4, 5, 6, 7, 8, 9, 12, 14, 15, 16, 17, 18, 20, 21, 22, 25 have been amended.

***Claim Rejections - 35 USC § 101***

2. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

3. Claims 1-11, 25-26, and 27 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter. Claims 1-11, 25-26, and 27 are rejected under 35 U.S.C. 101 based on Supreme Court precedent and recent Federal Circuit decisions. The Office's guidance to examiners is that a § 101 process must (1) be tied to a particular machine or (2) transform underlying subject matter (such as an article or materials) to a different state or thing. *Diamond v. Diehr*, 450 U.S. 175, 184 (1981); *Parker v. Flook*, 437 U.S. 584, 588 n.9 (1978); *Gottschalk v. Benson*, 409 U.S. 63, 70 (1972); and *Cochrane v. Deener*, 94 U.S. 780,787-88 (1876).

4. An example of a method claim that would not qualify as a statutory process would be a claim that recited purely mental steps. Thus, to qualify as a § 101 statutory process, the claim should positively recite the particular machine to which it is tied. This can be done, for example, by identifying the apparatus (machine) that accomplishes the

method steps, by positively reciting the subject matter that is being transformed, or by identifying the material that is being changed to a different state.

5. Applicant's method steps in claims 1 and 9 fail the first prong of the new Federal Circuit decision since they are not tied to a particular machine and can be performed without the use of a particular machine/apparatus. In addition, the tie to a particular apparatus, for example, cannot be mere extra-solution activity. See *In re Bilski*, 88 USPQ2d 1385 (Fed. Cir. 2008). In this particular case, claims 1, 9 and 25 fail prong (1) because the "tie" (e.g. at least one of displaying the composite collection of medical information on a display or storing the merged collection of medical information in a computer memory) is representative of insignificant extra-solution activity.

6. Claims 2-8, 10-11, 26 and 27 inherit the deficiencies of claim 1, 9 and 25 through dependency and are also rejected.

#### ***Claim Rejections - 35 USC § 102***

7. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

8. Claims 1-28 are rejected under 35 U.S.C. 102(e) as being unpatentable by Cooke, Jr. et al. (hereinafter Cooke) (U.S. Patent No. 6,574,629 B1).

A. Claim 1 has been amended now to recite a computer-implemented medical information merging method, comprising:

- i. identifying a patient's first collection of medical information with a first collection identifier, and a logically related or similar second collection of medical information with a second collection identifier, the first collection identifier being different from the second collection identifier (Cooke; col. 8, lines 38-46, col. 11, lines 41-54);
- ii. merging the patient's first collection of medical information with the second collection of medical information, to create a composite collection of medical information (Cooke; col. 11, line 41 to col. 12, line 6, col. 21, lines 24-33, fig. 12);
- iii. during the merging, reconciling the first and second collection identifiers of the first and second collections of medical information (Cooke; col. 8, lines 38-46, col. 11, lines 41-54);
- iv. during said merging, automatically adding medical information, according to a protocol attribute, of the first or second collection of medical information into the other of the first or second collection of medical information in the creating of said composite collection of medical information (Cooke; col. 8, lines 47-60, col. 11, lines 41-54); and
- v. at least one of displaying the composite collection of medical information on a display or storing the merged collection of medical

information in a computer memory (Cooke; col. 2, lines 20-31, col. 3, line 50 to col. 4, line 3, col. 11, line 55 to col. 12, line 6).

B. Claim 2 has been amended now to recite the medical information merging method of claim 1, wherein the medical information is at least one of medical images, patient measurements, findings, comments, waveforms, Doppler audio, and a medical study report (Cooke; abstract, col. 5, line 66 to col. 6, line 4).

C. Claim 3 has been amended now to recite the medical information merging method of claim 2, further comprising computing patient measurement information of the first collection of medical information, based on the patient measurements in the second collection of medical information, upon said merging (Cooke; col. 10, line 54 to col. 11, lines 3).

D. Claim 4 has been amended now to recite the medical information merging method of claim 1, wherein said adding comprises adding stage information of the second collection of medical information to the first collection of medical information according to a protocol attribute of the second collection of medical information (Cooke; col. 11, lines 41-54, col. 26, lines 50-60).

E. Claim 5 has been amended now to recite the medical information merging method of claim 1, wherein the first and second collections of medical information include unique identifiers according to a lexicon of Digital Imaging and Communication in Medicine (DICOM) (Cooke; col. 5, line 66 to col. 6, line 4).

F. Claim 6 has been amended now to recite the medical information merging method of claim 1, wherein said adding comprises adding a series instance

identifier, for a series of the second collection of medical information, to the first collection of medical information without generating a new series instance identifier in the first collection of medical information for said series of the second collection of medical information (Cooke; col. 8, lines 38-46, col. 11, line 55 to col. 12, line 6).

G. Claim 7 has been amended now to recite the medical information merging method of claim 1, wherein said adding comprises adding new medical information of the second collection of medical information to the composite collection of medical information based on the new medical information including a collection identifier of the second collection of medical information (Cooke; col. 8, lines 38-46, col. 11, line 55 to col. 12, line 6).

H. Claim 8 has been amended now to recite the medical information merging method of claim 1, further comprising identifying the first and second collections of medical information, wherein said merging is initiated from a terminal remote from a storage unit containing either of the first and second collections of medical information (Cooke; col. 11, lines 28-36).

I. Claim 9 has been amended now to recite a computer-implemented study merging method, comprising:

- i. identifying a patient's first medical study, which first medical study includes a first study identifier, and a logically related or similar second medical study, which second medical study includes a second study identifier (Cooke; col. 8, lines 38-46, col. 11, lines 41-54);

- ii. in response to a user request, merging the patient's first medical study with the second medical study to create a merged study, such that medically context-specific information stored in at least one of the first and second medical studies is merged based upon a protocol of at least one of the first and second studies, the protocol being indicated by an attribute of at least one of the first and second studies (Cooke; col. 11, line 41 to col. 12, line 6, col. 21, lines 24-33, fig. 12);
  - iii. saving respective identifiers of the first and second studies (Cooke; col. 8, lines 38-46, col. 11, lines 41-54);
  - iv. deleting a distinct database identity for at least one of the first and second studies (Cooke; col. 9, lines 22-42);
  - v. assigning a unique study identifier (is met by accession number) to the merged study (Cooke; col. 8, lines 38-46, col. 11, lines 41-54, Table 5); and
  - vi. at least one of displaying the merged study on a terminal and storing the merged study in a computer storage medium (Cooke; col. 2, lines 20-31, col. 3, line 50 to col. 4, line 3, col. 11, line 55 to col. 12, line 6).
- J. Claim 10 has been amended now to recite the study merging method of claim 9, wherein the medically context specific information is stage information (Cooke; col. 11, lines 41-54).



K. Claim 11 has been amended now to recite the study merging method of claim 9, wherein the medically context specific information is measurement information (Cooke; col. 11, lines 41-54).

L. As per claims 12-18 and 21, they are article of manufacture claims which repeat the same limitations of claims 1-8 the corresponding method claim, as a collection of executable instructions stored on machine readable media as opposed to a series of process steps. Since the teachings of Cooke disclose the underlying process steps that constitute the method of claims 1-8, it is respectfully submitted that they likewise disclose the executable instructions that perform the steps as well. As such, the limitations of claims 12-18 and 21, are rejected for the same reasons given above for claims 1-8.

M. Claim 19 recites the computer program product of claim 18, wherein said acts further comprise controlling the computer to notify a user when said adding of the new medical information is performed (Cooke; col. 11, lines 41-54, Table 6).

N. Claim 20 has been amended now to recite the computer program product of claim 12, further comprising controlling the computer to delete a distinct database identity of the second collection of medical information (Cooke; col. 9, lines 22-42).

O. As per claims 22-24, they are article of manufacture claims which repeat the same limitations of claims 9-11 the corresponding method claim, as a collection of executable instructions stored on machine readable media as

opposed to a series of process steps. Since the teachings of Cooke disclose the underlying process steps that constitute the method of claims 9-11, it is respectfully submitted that they likewise disclose the executable instructions that perform the steps as well. As such, the limitations of claims 22-24, are rejected for the same reasons given above for claims 9-11.

P. Claim 25 has been amended now to recite a computer-implemented medical study merging method, comprising:

- i. identifying, in accordance with a lexicon of Digital Imaging and Communication in Medicine (DICOM), a patient's related first and second medical studies to be merged, the first medical study having a first identifier and the second medical study having a second identifier different from the first medical study identifier (Cooke; col. 5, line 66 to col. 6, line 4, col. 8, lines 38-46, col. 11, lines 41-54);
- ii. merging the first medical study with the second medical study, according to a protocol attribute, to create a resultant composite study having a study identifier different from at least one of the first and second identifiers of the first and second medical studies, wherein, in accordance with said lexicon, the merging includes an automatic adding of a series of the second medical study to the composite study, the series of the second medical study having a series identifier identical to a pre-merge corresponding series identifier, with the series of the second medical study including at least an artifact with an artifact identifier identical to a pre-

merge corresponding artifact identifier, such that the composite study includes series and corresponding series identifiers from both the premerged first and second medical studies (Cooke; col. 8, lines 38-46, col. 11, lines 41 to col. 12, line 6, col. 29, lines 4-55); and

iii. at least one of generating a human viewable display of the composite study and storing the composite study in computer storage (Cooke; col. 2, lines 20-31, col. 3, line 50 to col. 4, line 3, col. 11, line 55 to col. 12, line 6).

Q. Claim 26 recites the medical study merging method of claim 25, wherein the composite study is assigned a unique study identifier of the first medical study (Cooke; col. 8, lines 38-46, col. 11, lines 41-54, Table 5).

R. Claim 27 recites the study merging method of claim 1, wherein the study identifiers of the first and second medical studies are unique among studies in a database having the distinct database entity (Cooke; col. 11, lines 41-54).

S. Claim 28 recites the computer readable medium of claim 12, wherein the study identifiers of the first and second medical studies are unique among studies in a database having the distinct database entity (Cooke; col. 7, lines 42-67, col. 11, lines 41-54).

### ***Response to Arguments***

9. Applicant's arguments with respect to claims 1-28 have been considered but are moot in view of the new ground(s) of rejection.

***Conclusion***

10. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).
11. A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.
12. Any inquiry concerning this communication or earlier communications from the examiner should be directed to DILEK B. COBANOGLU whose telephone number is (571)272-8295. The examiner can normally be reached on 8-4:30.
13. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Jerry O'Connor can be reached on 571-272-6787. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.
14. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should

you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/D. B. C./  
Examiner, Art Unit 3626  
4/27/2010

/C. Luke Gilligan/  
Primary Examiner, Art Unit 3626